

Title (en)

METHOD TO AUTOMATICALLY CONTROL A DRIVETRAIN PROVIDED WITH A SERVO-ASSISTED TRANSMISSION

Title (de)

VERFAHREN ZUR AUTOMATISCHEN STEUERUNG EINES SERVO-UNTERSTÜTZTEN GETRIEBES

Title (fr)

PROCÉDÉ DE COMMANDE AUTOMATIQUE D'UNE CHAÎNE CINÉMATIQUE ÉQUIPÉE D'UNE TRANSMISSION SERVO-ASSISTÉE

Publication

**EP 3798472 A1 20210331 (EN)**

Application

**EP 20199363 A 20200930**

Priority

IT 201900017519 A 20190930

Abstract (en)

A method to automatically control a drivetrain (6) provided with a servo-assisted transmission (7); the method comprises the steps of: measuring a rotation speed ( $\omega_{E}$ ) of the internal combustion engine (4); carrying out a shift to a lower gear in an autonomous manner and independently of an intervention of a driver, when the rotation speed ( $\omega_{E}$ ) of the internal combustion engine (4) reaches a lower threshold ( $TH_{DOWN}$ ); carrying out a shift to a higher gear in an autonomous manner and independently of an intervention of the driver, when the rotation speed ( $\omega_{E}$ ) of the internal combustion engine (4) reaches an upper threshold ( $TH_{UP}$ ); detecting a release of an accelerator pedal (22) in a first instant ( $t_1$ ); waiting, starting from the first instant ( $t_1$ ), a time interval (TO) until a second instant ( $t_2$ ), which is subsequent to the first instant ( $t_1$ ); and increasing a value of the lower threshold ( $TH_{DOWN}$ ) starting from the instant ( $t_2$ ) until a following pressing of the accelerator pedal (22).

IPC 8 full level

**F16H 59/18** (2006.01); **F16H 61/02** (2006.01); **F16H 59/36** (2006.01); **F16H 59/54** (2006.01); **F16H 61/688** (2006.01)

CPC (source: CN EP US)

**B60W 10/06** (2013.01 - CN); **B60W 10/113** (2013.01 - CN); **B60W 30/182** (2013.01 - CN); **F16H 59/18** (2013.01 - EP); **F16H 59/22** (2013.01 - US); **F16H 59/36** (2013.01 - US); **F16H 59/54** (2013.01 - US); **F16H 61/0213** (2013.01 - CN EP US); **B60W 2510/0638** (2013.01 - CN); **B60W 2540/10** (2013.01 - CN); **B60W 2540/12** (2013.01 - CN); **F16H 59/54** (2013.01 - EP); **F16H 61/688** (2013.01 - EP); **F16H 2059/366** (2013.01 - EP US); **F16H 2061/0216** (2013.01 - CN); **F16H 2061/0223** (2013.01 - EP); **F16H 2200/0056** (2013.01 - EP)

Citation (applicant)

US 8406968 B2 20130326 - HUBER KARL [AT], et al

Citation (search report)

- [A] US 8406968 B2 20130326 - HUBER KARL [AT], et al
- [A] US 2019249768 A1 20190815 - KISHI DAIGO [JP]
- [A] US 10190684 B2 20190129 - VU DAVID H [US], et al

Designated contracting state (EPC)

AL AT BE BG CH CY CZ DE DK EE ES FI FR GB GR HR HU IE IS IT LI LT LU LV MC MK MT NL NO PL PT RO RS SE SI SK SM TR

Designated extension state (EPC)

BA ME

DOCDB simple family (publication)

**EP 3798472 A1 20210331**; **EP 3798472 B1 20220720**; CN 112576739 A 20210330; CN 112576739 B 20231201; IT 201900017519 A1 20210330; JP 2021055841 A 20210408; US 11215279 B2 20220104; US 2021095760 A1 20210401

DOCDB simple family (application)

**EP 20199363 A 20200930**; CN 202011030274 A 20200927; IT 201900017519 A 20190930; JP 2020158633 A 20200923; US 202017017242 A 20200910